

ABSTRACT

THESIS: Children's and Adult's Visuospatial and Temporal Memory Abilities Using Picture Communication Symbols

STUDENT: Olivia Swim

DEGREE: Master of Arts

COLLEGE: Sciences and Humanities

DATE: July, 2014

PAGES: 43

This study investigated abilities of typically developing third-grade children and college-aged adults to identify, locate, and sequence picture communication symbols. Participants were asked to recreate 4 x 4 grid displays during a working memory task that assessed visuospatial and temporal memory through feature binding. Results revealed that children and adults demonstrated an equal mean proportion of recall on such features as object recall, location recall, and object-location binding, with a range of performance between 74%-to-100%. Additionally, developmental trends were obtained between the two groups on object-sequence and location sequence binding, with children recalling approximately 25% and adults recalling 55% (for both features). These data suggest that feature binding, especially object-sequence and location-sequence, undergoes maturation with age through adulthood. Nevertheless, it appears that without explicit feature binding intervention, both children and adults will demonstrate some challenges with visual-graphic communication given that feature binding ability for complex working memory tasks remains marginal in performance through adulthood.